

ACC NR: AP6033435

polarization of the measurement results to atmospheric conditions shows that for the air layer next to the earth the contribution of the complexes $[O_2]_2$ and $[O_2 - N_2]$ to the attenuation of the radiation in the 2600 - 2350 Å band is practically the same as the contributions of O_2 and O_3 . The author thanks G. V. Rozenberg for interest in the work and G. D. Turkin for help with the measurements. Orig. art. has: 3 figures, 2 formulas, and 2 tables.

SUB CODE: 20/ SUBM DATE: 10May65/ ORIG REF: 008/ OTH REF: 005

Card 2/2

ACC NR: AP7001853

SOURCE CODE: UR/0362/66/002/012/1253/1258

AUTHOR: Dianov-Klokov, V. I.; Matveyeva, O. A.

ORG: Institute of Atmospheric Physics, Academy of Sciences SSSR (Institut fiziki atmosfery, Akademiya nauk SSSR)

TITLE: The effect of $[O_2]$ and $[O_2-N_2]$ complexes on the transparency of the atmospheric surface layer

SOURCE: AN SSSR. Izvestiya. Fizika atmosfery i okeana, v. 2, no. 12, 1966, 1253-1258

TOPIC TAGS: atmospheric physics, atmospheric transparency, atmospheric optics, molecular absorption, Rayleigh scattering, ozone, aerosol

ABSTRACT: Direct measurements and laboratory data imply that approximately 40% of the total diffuse molecular absorption in the lower atmosphere in the 2800—2300 Å region is due to short-lived $[O_2]_2$ and $[O_2-N_2]$ complexes. The contribution of molecular oxygen (O_2) is approximately the same. The sum of decimal absorption coefficients for these constituents and for the Rayleigh scattering coefficient equals unity at 2400 Å, and increases rapidly with decreasing wavelength. Even for a minimum concentration of aerosols and ozone in the lower atmosphere, the atmospheric transparency

Card 1/2

UDC: 551.521.3

ACC NR: AP7001883

limit in the ultraviolet region is estimated to occur at $\lambda = 2400-2500 \text{ \AA}$.
Orig. art. has: 4 figures.

SUB CODE: 04/ SUBM DATE: 07May66/ ORIG REF: 001/ OTH REF: 006/
ATD PRESS: 5112

Card 2/2

DIANOVA, A.

We'll have a housewarming soon. Okhr.truda i sots.strakh.
no.12:46 D '59. (MIRA 13:4)

1. Predsedatel' komissii okhrany truda tsekha shassi Vladimirskego
traktornogo zavoda, deputat gorodskogo Soveta.
(Vladimir—Tractor industry)

53630

2209, 1266, 1287

86411
S/062/60/000/008/019/033/XX
B013/B055

AUTHORS: Arbuzov, B. A. and ~~Dianova~~ (Ukhvatova), E. N.

TITLE: 2-Cyclopentenyl-1-phosphinic Acid Esters and Some Derivatives

PERIODICAL: Izvestiya Akademii nauk SSSR. Otdeleniye khimicheskikh nauk,
1960, No. 8, pp. 1399-1404

TEXT: The effect of trialkyl phosphites and sodium dialkyl phosphites on 3-chloro 1-cyclopentene was studied in the present paper. Treatment of 3-chloro 1-cyclopentene with triethyl phosphite did not yield the desired result: The reaction did not take place at lower temperatures, while at 120°C cyclopentadiene formed in quantitative yield by elimination of hydrogen chloride. With triethyl phosphite, the latter gave ethyl chloride and diethyl phosphinic acid. The reaction of 3-chloro 1-cyclopentene with sodium diethyl phosphite, however, gave the expected cyclopentenyl phosphinic acid ester. By similar reactions, other esters of 2-cyclopentenyl 1-phosphinic acid were obtained. These esters are readily oxidized by acetyl hydroperoxide with formation of the corresponding oxides. The oxidation of the 2-cyclopentenyl 1-phosphinic acid n-butyl and isobutyl esters by acetyl hydroperoxide, gave besides the oxides also higher-

Card 1/2

86411

2-Cyclopentenyl-1-phosphinic Acid Esters and Some Derivatives S/062/60/000/008/019/033/XX
B013/B055

boiling fractions. By ultimate analysis and molar refraction, the compounds obtained are shown to correspond to products formed by the elimination of one molecule of water from glycols. The existence of a double bond in these compounds was established by titration with peroxy-phthalic acid and the infrared spectrum of the isobutyl ester. The position of the double bond is still unclear. The formation of cyclopentenyl phosphinic acid ester is explained by the splitting off of acetic acid during distillation of the oxide obtained with acetyl hydroperoxide. The previously observed stability (Ref. 4) of carbocyclic oxides containing a COOR or CN-substituted six-membered ring towards isomerizing agents was confirmed. The oxides readily hydrated in aqueous dioxane in the presence of hydrochloric acid. The 2,3-dihydroxy-(trans)1-cyclopentyl 1-phosphinic acid esters are viscous and can be distilled in vacuo without decomposition. There are 3 tables and 5 Soviet references.

ASSOCIATION: Khimicheskiy institut im. Butlerova Kazanskogo universiteta
im. V. I. Ul'yancva-Lenina (Chemical Institute imeni
Butlerov of Kazan' University imeni V. I. Ul'yancv-Lenin)

SUBMITTED: March 17, 1959

Card 2/2

ARBUZOV, B.A.; DIANOVA, E.N.

Esters of cyclohexen-2-yl-1-phosphonic acid and some of their derivatives. Izv. AN SSSR. Otd.khim,nauk no.7:1288-1291 J1 '61.
(MIRA 14:7)

1. Khimicheskiy institut im. A.M. Butlerova Kazanskogo universiteta im. V.I. Ul'yanova-Linina.
(Phosphonic acid)

ARBUZOV, B.A.; DIANOVA, E.N.; SHAGIDULLIN, R.R.

Reaction of carbon disulfide with sodium diethylphosphite.
Zhur.ob.khim. 31 no.12:4015-4019 D '61. (MIRA 15:2)

1. Nauchno-issledovatel'skiy khimicheskiy institut imeni A.M.
Butlerova pri Kazanskom gosudarstvennom universitete i Kazanskiy
filial AN SSSR.

(Carbon disulfide)
(Phosphorous acid)

ARBUZOV, B.A., DIANOVA, E.N.

Esters of cyclopentene-2-yl- and cyclohexane-2-yl phosphinic acids and certain of their derivatives.

Khimiya i Primeneniye Fosfororganicheskikh Soedineniy (Chemistry and application of organophosphorus compounds) A. YE. ARBUZOV, Ed.
Publ. by Kazan Affil. Acad. Sci. USSR, Moscow 1962, 412 pp.

Collection of complete papers presented at the 1962 Kazan Conference on Chemistry of Organophosphorus Compounds.

L 16080-65 EWT(m)/EPF(c)/EWP(j) Pc-4/Pr-4 SSD/AEWL JXT(CZ)/RM
ACCESSION NR: AP5001947 S/0020/64/158/001/0137/0140

AUTHOR: Arbutov, B. A. (Academician); Dianova, E. N.; Vinogradova, V. S.;
Shamsutdinova, A. K. B

TITLE: Reaction of sodium diethylphosphide with 1, 2-dibromocyclohexane and 1, 2-dibromomethane

SOURCE: AN SSSR. Doklady, v. 158, no. 1, 1964, 137-140

TOPIC TAGS: phosphorus compound, hexane, bromine, organosodium compound, distillation

Abstract: The reaction of sodium diethylphosphide with 1, 2-dibromocyclohexane was studied to determine which phosphorus derivatives are formed. The following compounds were found after distillation of the resulting cyclohexane and phosphorus-containing products: 1) diethylphosphorous acid; 2) a fraction with a 61-61.5° boiling point (2.5 mm), which proved to be a mixture of dibromocyclohexane (60%) with triethylphosphate (40%); 3) tetraethylpyrophosphite; 4) tetraethyl ester of subphosphoric acid; 5) a fraction with a 131-134° (2 mm) boiling point, which may prove to be tetraethylpyrophosphate, although its physical constants differed somewhat from pyrophosphate constants. It was thus found that organophosphorus

Card 1/2

L 15080-65
ACCESSION NR: AP5001947

compounds obtained in the reaction of dibromocyclohexane with sodium diethylphosphide proved to be the same as those for the reaction of sodium diethylphosphide with bromine. Orig. art. has 3 articles and 1 figure.

ASSOCIATION: Nauchno-issledovatel'skiy institut im. A. M. Butlerova (Scientific Research Institute); Kazanskogo gosudarstvennogo universiteta im. V. I. Ul'yanova-Lenina (Kazan' State University)

SUBMITTED: 09May64

ENCL: 00

SUB CODE: OC, GC

NO REF SOV: 005

OTHER: 007

JPRS

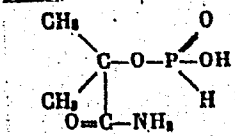
Card 2/2

ARBUZOV, B.A.; DIANOVA, E.N.; VINOGRADOVA, V.S.; SHAMSUTDINOVA, A.K.

Nature of di- α -cyanoisopropyl ester of phosphorous acid.
Izv. AN SSSR. Ser. khim. no.8:1389-1396 '65.

(MIRA 18:9)

1. Khimicheskiy institut im. A.M. Butlerova Kazanskogo
gosudarstvennogo universiteta.

L 1129-66 (N) EWT(1)/EWT(m)/EPF(c)/EWP(j)/EWA(b)-2/EWA(c) RPL JW/EW/RO/RM
 44,55 44,55 44,55 44,55
 ACCESSION NR: AP5022930 UR/0062/65/000/008/1389/1396
 661.718.1
 AUTHOR: Arbuzov, B. A.; Dianova, E. N.; Vinogradova, V. S.; Shamsutdinova, A. K.
 TITLE: The nature of di- α -cyanisopropyl ester of phosphorous acid 7,6,44,55
 SOURCE: AN SSSR. Izvestiya. Seriya khimicheskaya no. 8, 1965, 1389-1396 46
 TOPIC TAGS: ester, phosphorous acid, IR spectrum 43
 ABSTRACT: The structure of di- α -cyanisopropyl

 and tri- α -cyanisopropyl esters of phosphorous acid were investigated by IR spectroscopy. The IR spectra were taken using a Higler H-800 spectrophotometer. The 2000-3500 cm^{-1} range was investigated with an IKS-1^h spectrophotometer. The IR spectrum
 Card 1/3

L 1129-66

ACCESSION NR: AP5022930

of di- α -cyanisopropyl ester of phosphorous acid is shown in fig. 1 of the Enclosure. To verify the structure, these spectra were compared with the spectra of products from hydrolysis of the chloroanhydride of di- α -cyanisopropyl phosphoric acid. It was found that di- α -cyanisopropyl as well as tri- α -cyanisopropyl esters of phosphoric acid contain an atom of pentavalent phosphorous. Orig. art. has: 5 figures, 1 formula.

ASSOCIATION: Khimicheskiy institut im. A. M. Butlerova Kazanskogo gosudarstvennogo universiteta (Chemical Institute, Kazan State University) 44,55

SUBMITTED: 24Jun63

ENCL: 01

SUB CODE: GC, OC

NO REF SOV: 003

OTHER: 007

Card 2/3

L 1129-66

ACCESSION NR: AP5022930.

ENCLOSURE 01

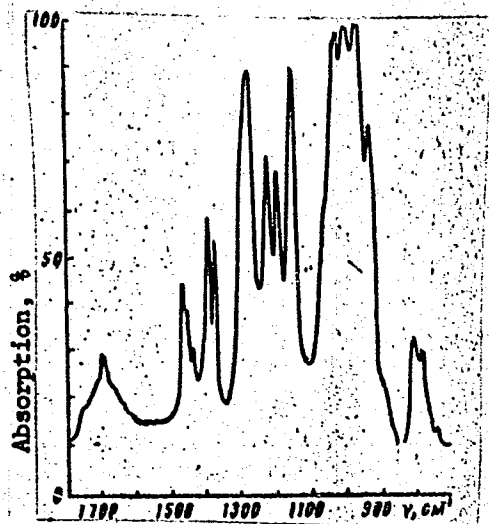


Fig. 1.

Card 3/3

ARBUZOV, B.A.: DIANOVA, E.N.

Azeotropes of dialkylphosphorous acids with some alcohols.

Izv. AN SSSR. Ser. khim. no.9:1584-1591 '65. (MIRA 18:9)

1. Kazanskiy gosudarstvennyy universitet im. V.I. Ul'yanova-Lenina.

L 20773-66

EWP(J)/EWI(m)

RM

ACC NR: AP6012034

SOURCE CODE: UR/0020/65/160/001/0099/0102

AUTHOR: Arbuzov, V. A. (Academician); Dianova, E. N.; Vinogradova, V. S.;
Shamsutdinova, A. K.

ORG: Chemical Institute im. A. M. Butlerov, Kazan' State University im. V. I. Ul'yandov-
Lenin (Khimicheskii institut pri Kazanskom gosudarstvennom universitete)

TITLE: Reactions of tri-(alpha-cyanoisopropyl) phosphite, ethyl-di-tert-(beta,beta,beta-trichlorobutyl) phosphite, and tri-(beta,beta,beta-trichloroethyl) phosphite with chloral

SOURCE: AN SSSR. Doklady, v. 160, no. 1, 1965, 99-102

TOPIC TAGS: organic phosphorous compound, chlorine compound, ester, chemical reaction

ABSTRACT: Tri-(alpha-cyanoisopropyl) phosphite was found to react with chloral at room temperature, forming the di-alpha-cyanoisopropyl ester of alpha-hydroxy-(beta,beta,beta-trichloroethyl)-phosphinic acid, splitting off methacrylonitrile. The reaction between chloral and tri-ter-(beta,beta,beta-trichlorobutyl) phosphite produced di-ter-(beta,beta,beta-trichlorobutyl)-phosphorous acid, which in turn reacted with chloral to give the di-ter-(beta,beta,beta-trichlorobutyl) ester of alpha-hydroxy-beta,beta,beta-trichloroethylphosphinic acid. The reaction of chloral with mixed di-ter-(beta,beta,beta-trichlorobutyl)-ethyl phosphite produced the di-ter-(beta,beta,beta-trichlorobutyl) ester of alpha-hydroxy-beta,beta,beta-trichloroethylphosphinic acid and di-ter-(beta,beta,beta-trichlorobutyl)-(beta,beta,beta-dichlorovinyl) phosphate. Another complete phosphite with electro-negative groups in the ester radicals, tri-(beta,beta,beta-trichloroethyl)

Card 1/2

L 20773-66

ACC NR: AP6012034

phosphite, reacted with chloral at room temperature to give the di-beta,beta,beta-trichloroethyl ester of alpha-hydroxy-beta,beta,beta-trichloroethylphosphinic acid. The reaction mechanisms and infrared spectra of the reaction products are discussed. Orig. art. has: 4 figures. [JPRS]

SUB CODE: 07 / SUBM DATE: 11Jun64 / ORIG REF: 005 / OTH REF: 003

Card 2/2

L 26749-66 EWT(m) JD/JG

ACC NR: AP6011479

SOURCE CODE: UR/0070/66/011/002/0334/0338

AUTHOR: Belyayev, L. M.; Litvin, B. N.; Dianova, I. M.; Mel'nikov, O. K. 40
B

ORG: Institute of Crystallography, AN SSSR (Institut kristallografi AN SSSR)

TITLE: Hydrothermal synthesis of crystal phosphors of the type $\text{Na}_x\text{Zn}_y\text{Si}_p\text{O}_q$

SOURCE: Kristallografiya, v. 11, no. 2, 1966, 334-338

TOPIC TAGS: zinc compound optic material, crystal phosphor, synthetic material, luminescence, luminescence spectrum

ABSTRACT: This is a continuation of earlier research (Kristallografiya v. 9, no. 6, 943, 1964) on hydrothermal synthesis of sodium zinc silicates. The present article describes six different crystal phosphors synthesized by this method, with different relative compositions of the components ($\text{Na}_2\text{O}-\text{ZnO}-\text{SiO}_2-\text{H}_2\text{O}$) and their crystal structures. To obtain luminescent zinc silicates of sodium, an activator in the form of MnO was introduced in the charge. Five out of the six crystals produced a luminescence in the green region of the spectrum under the influence of ultraviolet light, although the maxima were not the same for all crystals. One of the produced crystals was the previously produced willemite $\text{Zn}_2\text{SiO}_4(\text{Mn})$ whose luminescent properties are well known. However, the maximum obtained for this crystal was somewhat different from the published data, and this difference is ascribed to the difference in the method of preparing the crystal. Orig. art. has: 6 figures.

SUB CODE: 20/ SUBM DATE: 09Feb65/ ORIG REF: 004/ OTH REF: 003

Card 1/1 5

UDC: 548.52

ACCESSION NR: AP4043196

S/0070/64/009/004/0571/0574

AUTHORS: Litvin, B. N.; Dianova, I. M.; Kachan, L. A.

TITLE: Synthesis and properties of single crystals of the compound
 $\text{Na}_2\text{O} \cdot 2\text{MnO} \cdot 2\text{SiO}_2$

SOURCE: Kristallografiya, v. 9, no. 4, 1964, 571-574

TOPIC TAGS: crystal growth, synthetic crystal, manganese compound,
silicate, single crystal

ABSTRACT: The authors attempted to synthesize hydrothermally a manganese silicate in which the Mn-Mn interaction is weakened by some "inert" component. Sodium was found suitable for this purpose. The crystallization was carried out in a 200-cm³ autoclave lined with titanium. A mixture of MnO and SiO₂ was placed at the bottom of the autoclave and a concentrated solution of sodium hydrate was poured over it. The closed autoclave was then placed in a resistance

Card 1/4

ACCESSION NR: AP4043196

oven for 200 hours and subsequently cooled for 8--10 hours. Large crystals were obtained when the temperature gradient amounted to 1 deg/cm. No change in the production of crystals was observed on changing the concentration of the solute from 20 to 35 weight per cent, or on varying the ratio of MnO to SiO₂ from 2:1 to 1:2. On lowering the NaOH concentration the yield decreases; on increasing the concentration larger crystals (up to 10 mm) are obtained. The crystals are amber in color, transparent, and optically positive. Their specific gravity is 3.46 ± 0.2 , the hardness 6, the luster glassy, and the fracture conchoidal. The indices of refraction are: $n'_g = 1.656$, $n'_m = 1.647$, $n'_p = 1.641$. The crystals are monoclinic with $a = 8.4$, $b = 13.6$, and $c = 5.69$ Å; $\beta = 90^\circ$ and $Z = 2$. The space group is $P2_1/c$. The best developed faces are the (100), (110), (120), and (101). The interplanar distances are given in a table (Encl. 01). The chemical composition of the crystals is SiO₂--36.5%, Fe₂O₃--traces, MnO--44.01%, Na₂O--18.80%. The proposed formula may be Na₂Mn₂Si₂O₇. The sodium to manganese ratio is unity. In the structure of this

Cord 2/4

ACCESSION NR: AP4043196

phase Mn and Na octahedra may alternate. A strong "dilution" by Na octahedra should strongly decrease or altogether exclude Mn-Mn interactions. The crystals exhibit red luminescence under UV excitation; they do not luminesce under x-ray excitation. The appearance of a 650 mμ band at room temperature can be ascribed to the considerable weakening or the complete absence of the Mn-Mn interaction. The absorption spectrum taken on an EPS-2V spectrophotometer is described. The chemical analysis was performed by V. S. Bykova. "The authors thank Academician N. V. Belov for help in carrying out the work and Dr. of Phys.-math Sci. L. M. Belyayev for a useful discussion of the results."Orig. art. has: 3 tables and 3 figures.

ASSOCIATION: Institut kristallografii AN SSSR (Institute of Crystallography AN SSSR)

SUBMITTED: 19Sep63

ENCL: 01

SUB CODE: SS

NR REF SOV: 001

OTHER: 002

Card 3/4

LITVIN, B.N.; DIANOVA, I.M.; KACHAN, L.A.

Synthesis and properties of single crystals of the composition
 $\text{Na}_2\text{O} \cdot 2\text{MnO} \cdot 2\text{SiO}_2$. Kristallografiia 9 no.4:571-574 J1-Ag '64.
(MIRA 17:11)

1. Institut kristallografi AN SSSR.

DIANOVA, K.G.

Composting peat. Mikrobiol. zhur. 17 no.4:66-67 '55
(MLRA 10:5)

1. Z Institutu mikrobiologii AN URSS
(COMPOST) (PEAT)

USSR/Soil Science - Organic Fertilizers.

J-4

Abs Jour : Ref Zhur - Biol., No 9, 1958, 39030

Author : Dianova, K.~~E~~
* Inst :
Title : Microbiological Study of Peat Composts. Communication 2.
The Influence of Peat Composts on the Microflora of the
Rhizosphere of Agricultural Crops.

Orig Pub : Mikrobiologichnyi zh., 1956, 18, No 2, 11-16.

Abstract : Experiments showed, that the introduction of peat composts
in soil contributes to the increase of the total amount of
microorganisms in the rhizosphere of potato and rye. In
the potato rhizosphere in certain periods of the growth,
ammonifying, nitrifying, nitrofixing and cellulose decom-
posing soil activity increases as well as the content of
general and hydrolyzed nitrogen.

* Z INSTITUT MIKROBIOLOGII AN URSS.

Card 1/1

- 18 -

MARTAKOV, A.A.; DIANOVA, O.P.

Processing berries before the extraction of juice by a ferment
preparation of *Aspergillus niger*. Trudy Inst.mikrobiol.i virus.AN
Kazkah.SSR 6:146-154 '62. (MIRA 15:8)
(*ASPERGILLIUS*) (BERRIES) (ENZYMES)

MARTAKOV, A.A.; DIANOVA, O.P.; KRASNOSHCHEKOVA, V.S.

Evaluation of the activity of pectolytic enzymes based on
the optical density and viscosity of the pectin solution.
Trudy Inst. mikrobiol. i virus. AM Kazakh. SSR 7:69-76 '63
(MIRA 16:12)

DIANOVA, R.G.

Mechanism of the hypotensive effects of platyphylline. Farm.1
toks. 23 no.1:13-17 Ja-F '60. (MIRA 14:3)

1. Kafedra farmakologii Astrakhanskogo gosudarstvennogo meditsin-
skogo instituta (zav. - prof. G.A.Malov [deceased]) i kafedra
farmakologii Kalininskogo gosudarstvennogo meditsinskogo instituta
(zav. - dotsent M.M.Desnitskaya).
(HYPERTENSION) (ALKALOIDS)

DIANOVA, R.G.

Effect of platphyllino on the activity of certain substances depressing the central nervous system. Farm. i toks. 23 no.2:106-109 Mr-Ap '60. (MIRA 14:3)

1. Kafedra farmakologii Astrakhanskogo gosudarstvennogo meditsinskogo instituta (zav. - prof. G.A.Malov [deceased]) i kafedra farmakologii Kalininskogo gosudarstvennogo meditsinskogo instituta (zav.-dotsent M.M.Desnitskaya).
(ALKALOIDS) (PSYCHOPHARMACOLOGY)

DIANOVA, R.G., assistant

Mechanism of corchoroside action on vessels. Trudy KGMi no.10:198-
201 '63. (MIRA 18:1)

1. Iz kafedry farmakologii (zav. kafedroy - doktor med. nauk M.M.
Desnitskaya) Kalininskogo gosudarstvennogo meditsinskogo instituta.

DIANOVA, R.G.

Effect of strophanthin on vessels in changes of carbohydrate metabolism. Farm. i toks. 28 no.1:55-57 Ja-F '65.

(MIRA 18:12)

1. Kafedra farmakologii (zav. - prof. M.M.Desnitskaya) Kalininskogo meditsinskogo instituta. Submitted July 23, 1963.

W. Bittel

BIANCINI, T. V.

Tuffaceous lavas in the districts of Isosvk and Krasnou-
ral'sk. T. V. Dianovsk and G. A. Kufitsina. *Trudy*
Gorn.-Geol. Inst. Akad. Nauk S.S.S.R., Ural. Filial 1935,
No. 20, 182-92. — Volcanic rocks intermediate between lava
flows and tuff ejectamenta have been described by Abikh
(1882) from Armenia, later from Kamchatka, and the
Crimea. New quarry and fluvial erosion aspects are
given from the northern part of the Middle Ural, with typi-
cal tuffaceous textures, but on smaller volcanic bombs or
lapilli embedded in a tuffaceous to dense lava cement.
Typical analyses are given for such bombs of charo-por-
phyrite, and pyroxene-plagioclase-porphyrite, and of
the "binder" cement which is usually also of the pyroxene-
plagioclase-porphyrite type. Complete analyses (4) of
gray-violet or dark-green tuffaceous lavas of the Kras-
noual'sk district show decreasing CaO contents related to
increasing Na₂O content — a typical albitization process.
The strong color changes in the rocks are detd. by the more
or less pronounced changes in the ratios FeO:Fe₂O₃. A
very fresh rock of the type mentioned above from a depth of
129 m. showed an andesite-dacitic compn. with 4.58% FeO;
and only 0.64% Fe₂O₃; Na₂O is high (4.72%), K₂O low
(0.53%), CaO and MgO are 1.88% and 2.16%, resp. The
andesitic tuffaceous lavas of the Isosvk district also show
intense albitization, chloritization, and leucosene in the
cementing portions, also silicified variations in dark-colored
and even dense samples, with abundant chalcedony, car-
bonates, and epidote. The original brecciated structure of

DIANOVA, T.V.

Volcanic rocks in the eastern part of the Pavda region.
Gor.-geol.inst.UFAN SSSR no.33:3-139 '59. (MIRA 13:4)
(Ural Mountains--Rocks, Igneous)

DIANOVA, T.V. /

Sulfide mineralization in rocks of the brecciated formation in the
Sultanovo pyrite deposit. Trudy Gor.-geol. inst. UFAH SSSR no.43:
153-160. 1959. (MIRA 13:11)

• (Sultanovo region--Pyrites) (Breccia)

DIANOVA, T.V.

Examples of ancient tuff lavas in volcanogenic strata of the
Central Urals. Trudy Lab. vulk. no.20:165-168 '61. (MIRA 14:11)

1. Gornogeologicheskii institut Ural'skogo filiala AN SSSR.
(Ural Mountains--Volcanic ash, tuff, etc.)

DIANOVA, T.V.

Some remarks on the nomenclature of effusive rocks. Izv. AN SSSR.
Ser. geol. 26 no. 1: 94-96 Ja '61. (MIRA 15:6)
(Rocks, Igneous--Nomenclature)

DIANOVA, T.V.

Vein rocks of the Sultanovskoye pyrite deposit in the Central
Urals. Trudy Inst. geol. UZAN SSSR no.70:169-184 '65.
(MIRA 18:12)

9.2560

24875

S/109/61/006/007/015/020
D262/D306

9.2580 (1163)

AUTHORS: Braginskiy, V.B., Dianova, V.A., and Mustel', Ye.R.

TITLE: Investigation of the operation of a frequency multiplier using the non-linear capacity of the p-n-junction

PERIODICAL: Radiotekhnika i elektronika, v. 6, no. 7, 1961,
1173 - 1177

TEXT: The above problem was investigated for large coefficients of multiplication (up to $n = 50$). Main scheme of the multiplier is given in Fig. 2. The multiplier consists of a 70 ohm coaxial line and a standard coaxial - waveguide passage. In the gap is situated diode 1, with its non-linear capacity. An alternating potential from a generator (frequency range: 184 - 600 Mc/s) is connected to the input of the multiplier through a constant attenuator (10-12 db). Maximum power from the generator: 3.5 W. Coaxial piston 2 and the non-linear element form the input contour. Piston 2 is isola-

Card 1/5

24875

S/109/61/006/007/015/020
D262/D306

Investigation of the ...

ted from the outside tube of the coaxial. The output contour is formed by coaxial piston 3 and two quarterwave beakers 4. Through a diaphragm it is connected with a rectangular resonator which filters out the harmonics of a corresponding n-number. The Q-factor of the resonator is 200, which reduces the neighboring harmonics with 20 db in comparison. Without filtering, these harmonics are 5 times smaller, than the chosen harmonics. The output signal is fed into a spectroanalyzer, specially calibrated for power, or into a standard power meter. The output power of the multiplier is shown graphically as a function of the number of harmonics. Input signal changed from 184 to 600 Mc/s, output signal (9000 Mc/s) and input power remained constant. The ordinate represents the ratio of the output power of n-th harmonics to that of the 49th harmonics. -At input power $P_i = 100-150$ mW, the output power saturates, there for smaller coefficients of multiplication. For the investigation of phase stability 2 identical multipliers were used, with two valves and measuring line of the same direction. The signal came from a common generator. After 1 1/2 hours of warming up, the device

Card 2/5

24875

S/109/61/006/007/015/020
D262/D306

Investigation of the ...

was working for 9 hours without break. The amplitude changed by 19 %. Change in phase difference was less than 60°. To investigate the possibilities of modulation, an additional 10 Mc/s alternating signal was fed in. The spectro-analyzer showed a split of the line into components, standing at 10 Mc/s from each other. With large modulation it is possible to redistribute the energy between the central line and the side components. The greatest observed output power: 2.5 mW ($n = 36$, $\tau = (R_s C)_{u= -10v} = 0.36 \cdot 10^{-12}$ sec) the input power being of the order of 250 mW. This means that the transformation loss was not more than 20 db, which is 11 db better than the minimum loss observed, when an active non-linear element is used with an ideal filtering system on the same harmonics. The coefficient of power transformation and the magnitude of output power are slightly higher than those for a two-cascade multiplier. This type of multiplier can be used in measurements and also as a high-stability heterodyne. To achieve power of the order 1 mW, the time constant of p-n junction of the diode should be better than $1 \cdot 10^{-12}$ sec. There are 6 figures and 7 non-Soviet-bloc referen-
Card 3/5

2h875

Investigation of the ...

S/109/61/006/007/015/020
D262/D306

ces. The references to the 4 most recent English-language publications read as follows: C.H. Page, Harmonic generation with ideal rectifiers, Proc. I.R.E., 1958, 46, 10, 1738; D. Leenov, A. Uhler, Jr., Generation of harmonics and subharmonics at microwave frequencies with p-n junction diodes, Proc. I.R.E., 1959, 10, 1724; D.B. Leeson, S. Weinreb, Frequency multiplication with non-linear capacitors - A circuit analysis, Proc. I.R.E., 1959, 12, 2076; R. Lowell, M. Kiss, Solid-state microwave power sources using harmonic generation, Proc. I.R.E., 1960, 7, 1834.

ASSOCIATION: Fizichesky fakul'tet Moskovskogo gosudarstvennogo universiteta im. M.V. Lomonosova, kafedra teorii kolebaniy (Faculty of Physics, Moscow State University im. M.V. Lomonosov, Department of Theory of Oscillations)

SUBMITTED: November 17, 1960

Card 4/5

S/109/62/007/002/020/024
D256/D303

9,4 000

AUTHORS: Dianova, V.A., Maneshin, N.K., Mustel', Ye.R., and
Parygin, V.N.

TITLE: UHF-multiplier with a high multiplication factor

PERIODICAL: Radiotekhnika i elektronika, v. 7, no. 2, 1962,
348 - 349

TEXT: Preliminary results are reported on investigating a frequent multiplier with a p-n diode used as a non-linear capacity. The construction of the multiplier was essentially identical to that described previously by V.B. Braginskiy, et al. (Ref. 4: Radiotekhnika i elektronika, v. 6, no. 7, 1961, 1173), but the output frequency was increased to 24,000 Mcs/sec. The dependence of the output power upon the number of the harmonic is presented in the form of a graph showing that between the 32nd and 85th harmonics the power decreases smoothly by 14 db. The maximum signal observed was 70 db above the noise level. The time constant of the diode measured at 10 V was 1.14×10^{-13} sec. At 660 Mcs/sec input frequency the multiplier
Card 1/2

UHF-multiplier with a high ...

S/109/62/007/002/020/024
D256/D303

was found to be adequate for heterodyne purposes, and it was used successfully for recording signals from a molecular generator. There are 2 figures and 1 Soviet-bloc reference.

ASSOCIATION: Fizicheskiy fakul'tet Moskovskogo gosudarstvennogo universiteta im. M.V. Lomonosova (Faculty of Physics, Moscow State University im. M.V. Lomonosov) ✓ C

SUBMITTED: June 15, 1961

Card 2/2

L 19058-65 EWT(1)/EWA(h) Feb AFETR/ESD(c)/ESD(dp)

ACCESSION NR: AP4040918 S/0109/64/009/006/1079/1081

AUTHOR: Dianova, V. A.; Maneshin, N. K.; Mustel', Ye. R.; Pary*gin, V. N. ^B

TITLE: Frequency multiplier with a nonlinear capacitance and high-Q circuits

SOURCE: Radiotekhnika i elektronika, v. 9, no. 6, 1964, 1079-1081

TCPIG TAGS: frequency multiplier, nonlinear capacitance frequency multiplier, 120 mc frequency multiplier

ABSTRACT: A new design (see Enclosure 1) of frequency multiplier is reported. The input resonator with an internal helical conductor is tuned to 120 mc. Its cold Q-factor is about 600. The output toroid resonator is tuned to an n-th harmonic of the input signal; its cold Q-factor is about 700-900. The nonlinear element is represented by a p-n diode which acts as a coupling between the two resonators. For maximum output, the distance x is selected between $\lambda_{out}/4$ and $\lambda_{out}/2$. Outputs of 10 and 5 mw were obtained experimentally with multiplication factors

Card 1/3

L 19058-65

ACCESSION NR: AP4040918

18 and 24, respectively; the input power was 250-300 mw. Another multiplier was tested which had a multiplication factor of 2 and was intended as one stage of a multistage converter. It was found that: (1) the single-stage converter with a nonlinear capacitance has a conversion factor higher by 10 db than the multiplier with a nonlinear resistance; (2) the single-stage multiplier has a higher conversion factor than the multistage multiplier. Orig. art. has: 2 figures.

ASSOCIATION: none

SUBMITTED: 09May63

ENCL: 01

SUB CODE: EC

NO REF SOV: 003

OTHER: 003

Card 2/3

L 19058-65

ACCESSION NR: AP4040918

ENCLOSURE: 01

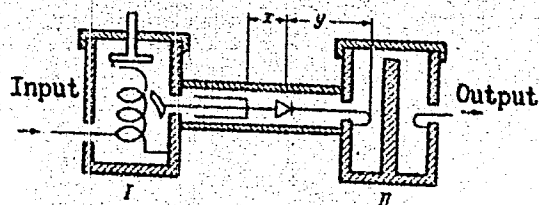


Fig. 1- Single-stage nonlinear-capacitance
frequency multiplier

Card 3/3

L 12963-65 EEO-2/EWT(d)/EWT(1)/EPF(c)/EEC-4/EEC(t)/EEC(b)-2/EED-2 Pm-4/P1-4/
 Pac-4 IJP(c) GG/WW
 UR/0109/65/010/004/0770/0772
 ACCESSION NR: AP5010115
 AUTHOR: Dianova, V. A.; Mustel', Ye. R.; Parygin, V. N.
 TITLE: Modulation of light by means of toroidal resonators with ADP crystals
 SOURCE: Radiotekhnika i elektronika, v. 10, no. 4, 1965, 770-772
 TOPIC TAGS: nonlinear optics, ADP crystal, light modulation, pulsed modulation, toroidal modulator

ABSTRACT: Modulation of light by ADP crystals is discussed. A modulator of the type shown in Fig. 1 of the Enclosure was used in the study. The ADP crystal was placed in a toroidal resonator with its optical axis in the direction of the electric field. The light was propagated in the same direction. If the light is polarized along one of the main crystal planes, the light behind the resonator is elliptically polarized. In the experiments, light was pulse-modulated (pulse width, 3 μ sec; repetition rate, 800 cps; pulse power, \sim 400 w) at frequencies of 204 Mc and 700 Mc. In the first case an ADP crystal ($C_{cr} \approx 12$ pf) 40 mm in diameter and 12 mm thick was used. The loaded Q of the resonator was \sim 500. The percentage modulation was \sim 18%, which corresponds to a phase shift of \sim 50%. A mirror placed on the output side of the modulator causes the beam to pass twice through the crystal. This doubles the phase shift and increases the percentage modulation to \sim 45%.

Card 1/3

L 42963-65

ACCESSION NR: AP5010115

In the second case (700 M μ), the capacitance of the crystal was reduced to 0.5 pf as a result of which the percentage modulation (at a pulsed power of ~ 27 w) was $\sim 13\%$. In both cases the length of crystal was $\ll l_{\text{max}}$. A further decrease of C_{cr} to 0.2 pf resulted in modulation with a duty factor equal to two. The percentage modulation was 33% at a 1.2-v modulating signal and 10% at an input power of 100 mw. The percentage modulation was determined by means of an FEU-17A photomultiplier (maximum response at $3900 \pm 300 \text{ \AA}$) and an oscillograph. Orig. art. has: 3 formulas and 3 figures. [YK]

ASSOCIATION: Fizicheskiy fakul'tet Moskovskogo gosudarstvennogo universiteta im. M. V. Lomonosova, Kafedra teorii kolebaniy (Physics Department, Moscow State University, Chair of the Theory of Oscillations)

SUBMITTED: 21Dec63

ENCL: 01

SUB CODE:SSDP

NO REF SOV: 000

OTHER: 003

ATD PRESS: 3236

Card 2/3

3.26106-66 EXT(d)
ACC NR: AP6014255

SOURCE CODE: UR/0109/66/011/005/0947/0949

AUTHOR: Dianova, V. A.; Mustel', Ye. R.; Parygin, V. N. 29
B

ORG: Physics Department, Oscillation Physics Section, Moscow State University im.
M. V. Lomonosov (Fizicheskiy fakul'tet Moskovskogo gosudarstvennogo universiteta.
Kafedra fiziki kotebaniy)

TITLE: Light modulation by 3.2 cm wave

SOURCE: Radiotekhnika i elektronika, v. 11, no. 5, 1966, 947-949

TOPIC TAGS: modulated light, optic modulator

ABSTRACT: An experimental investigation of light modulation was made at a frequency of 9260 Mc using the linear electro-optic effect in a single ADP crystal. A cylindrical resonator, in which E_{010} -type oscillations were excited, was used to produce the required longitudinal electric field. To reduce losses due to uhf and to increase the modulation efficiency, the resonator was partially filled with an electro-optical medium. A crystal, 3 mm in diameter and 10 mm long, was used for this resonator. Light modulation was accomplished in a pulsed regime with a large duty factor. With a 145-w modulating power a phase shift of 0.46 was obtained, which in turn corresponded to a modulation depth of 44%; with a modulating power of 9 w the modulation depth was 12%. The quality of the modulator for such a system was $1.4 \cdot 10^{-3} \text{ rad}^2/\text{w}$.

Cord 1/2

UDC: 535.241.13

L 26148-66

ACC NR: AP6014255

A modulator consisting of two identical resonators with ADP crystals was also investigated. Both resonators were excited by the same generator. An increase of 1.75 in the phase shift at crystal output was obtained for the case of an optimum phase. A shift in the uhf field phase by π from the optimum phase at wavelength $\lambda = 3.2$ cm reduced the modulation depth to zero. This confirmed the fact that light modulation actually occurred at $\lambda = 3.2$ cm. Orig. art. has: 3 figures. [JR]

SUB CODE: 09/ SUBM DATE: 11Jun65/ ORIG REF: 001/ OTH REF: .004/ ATD PRESS: 425f

Card

2/2

ACC NR: AP6036381 (N) SOURCE CODE: UR/0109/66/011/011/2082/2085

AUTHOR: Dianova, V. A.; Mustel', Ye. R.; Fishuk, A. P.

Department of Physics, (Fizicheskiy fakul'tet
ORG: Moscow State University im. M. V. Lomonosov Moskovskogo gosudarst-
vennoy universiteta)

TITLE: Frequency conversion using double modulation of light

SOURCE: Radiotekhnika i elektronika, v. 11, no. 11, 1966, 2082-2085

TOPIC TAGS: light modulation, frequency conversion

ABSTRACT: D. J. Blattner and F. Sterzer* proposed a system for optical-band frequency conversion which permits using low-frequency photo detectors for reception of SHF-signal-modulated light. The system comprises an electro-optical crystal (frequency converter), an analyzer, and a photo detector. A light modulated at frequency ω , falls on a crystal placed in a field of frequency ω_1 ;

Cord 1/2

ACC NR: AP6036381

the resulting light after the analyzer comes modulated by combination frequencies $m\omega \pm n\omega_1$, where m and n are equal to 0, 1, 2, 3, ... A lowest $\omega_1 - \omega_1$ frequency is of practical importance. A further analysis of the above system points up the expediency of a polarization modulation (instead of AM); the polarization modulation system is simpler (the analyzer and two $\lambda/4$ -plates not needed) and promises a double efficiency of conversion; the same electro-optical crystal can be used for modulation and conversion of frequency. In an experimental verification, a resonator was excited at 700 and 701 Mc, and an output signal of 1 Mc was received at the output of a photomultiplier. "The authors wish to thank V. N. Parygin for discussing the results." Orig. art. has: 2 figures and 9 formulas. * RCA Rev., 1962, 23, 3, 407.

SUB CODE: 20, 09 / SUBM DATE: 23Feb66 / ORIG REF: 003

Card 2/2

DIANOVA, V. V., USTINOVA, A. P., PETROVA, N. V., SHILOVA, S. A., TRACHENKO, N. N.,
KOROVINA, A. G. and GLADIKH, S. G.

"The Epidemiology and Prophylaxis of Tick-Borne Encephalitis in Molotovskaya Oblast," an article Presented at the Interblast' Scientific-Practical Conference of Medical Workers of the Urals, Siberia, and the Far East, Krasnoyarsk, 8-12 Dec 55.

Sum. No. 1047, 31 Aug 56

L 38424-66 EWT(1)/EWT(m)/EWT(t)/ETI IJP(c) GG/VW/JW/JD

ACC NR, AP6025266

SOURCE CODE: UR/0057/66/036/007/1319/1320

AUTHOR: Vinogradov, Ye. A.; Dianov, Ye. M.; Irisova, N. A.

ORG: Physics Institute im. P. N. Lebedev, Moscow (Fizicheskii Institut)

TITLE: Measurement of dielectric characteristics of liquid nitrogen¹¹ at wavelength $\lambda = 2.3 \text{ mm}$ ₂₇

SOURCE: Zhurnal tekhnicheskoy fiziki, v. 36, no. 7, 1319-1320

TOPIC TAGS: liquid nitrogen, dielectric constant, absorption coefficient

ABSTRACT: Measurements of dielectric characteristics of liquid nitrogen were made at wavelength $\lambda = 2.3 \text{ mm}$ to study the properties of solids immersed in liquid nitrogen. The liquid nitrogen was kept in a polystyrene cryostat and a Michelson interferometer was used to obtain the refraction index by measuring the monochromatic wavelength in free space and in liquid nitrogen. The transmittance T of a layer of nitrogen with thickness d was measured to determine the coefficient of absorption K from the relationship $T = e^{-4\pi k d/\lambda}$. The following results were obtained: coefficient of refraction, $n = 1.196 \pm 0.007$; coefficient of absorption, $K = (1.6 \pm 0.3) \cdot 10^{-4}$ for $\lambda = 2 \text{ mm}$, neglecting boiling of nitrogen at the walls of the Dewar. If the boiling layer at the walls is not neglected, then K can be as high as $4 \cdot 10^{-4}$. [IV]

SUB CODE: 20/ SUBM DATE: 20Nov65/ ORIG REF: 002/ ATD PRESS: 5043
Card 1/1 ₄₂ UDC: 537.226.1

DIANOVA, Ye.I.

~~Microbiological study of peat composts. Report No.1. Mikrobiol.zhur.~~

16 no.4:41-51 '54. (MIRA 10:1)

1. Z Institutu mikrobiologii Akademii nauk URSR.
(COMPOST) (SOIL MICROORGANISMS) (PEAT)

COUNTRY : USSR
 CATEGORY : Soil Science. Soil Biology. J
 RES. JOUR. : RzhBiol., No. 3, 1959, No. 10673
 AUTHOR : Dianova, Yo. I.
 INST. : Academy of Sciences, Ukrainian SSR
 TITLE : Studies of Microbiological Processes During the Maturing
 of Peat Composts.
 ORIG. PUB. : V sb.: Mestu. organ. udobreniya USSR. Kiyev, AN UkrSSR,
 1957, 142-149
 ABSTRACT : It has been determined that with the maturing of peat-
 manure composts with phosphorite fertilizer, the number
 of ammonifying, nitrifying, cellulose-destroying and
 butyric acid bacteria increases. In the initial period of
 composting, the non-sporogenous forms predominate which
 are later crowded out by actinomyces (Actinomyces fumosis,
 A. globisporus diastaticus). The author supposes that
 actinomyces can be one of the biological indicators of the
 degree of the maturity of the compost. The maximum content
 of available microflora in composts coincides with the
 CARD: 1/2

COUNTRY :
CATEGORY :

ABS. JOUR. : PESTMol., No. 3, 1959, No. 10673

AUTHOR :
INSTIT. :
TITLE :

ORIG. PUB. :

ABSTRACT : period of the greatest amount of easily soluble forms of
N. The feasibility of the utilization of organic nitrogen
(instead of manure) as a ferment for pest control was
also established. -- E. B. Garfield

Page 2/2

~~D~~YANOVA, Ye.V. *not same as histologist*

Therapy of second degree burns with preserved blood dressings.
Khirurgia no.8:75 Ag '54. (MLRA 7:11)

1. Iz Stalingradskoy zheleznodorozhnoy bol'nitsy.
(BURNS, therapy,
preserved blood dressings)
(SERTHERAPY,
preserved blood dressings in burns)

DIANOVA, Ye. V.

DIANOVA, Ye. V. -- "The Anatomy of the Renal Arteries, Constant and Supplementary, and Their Intraorganic Branching." Stalingrad State Medical Inst. Stalingrad, 1955. (Dissertation for the Degree of Candidate of Medical Sciences.)

SO: Knizhnaya letopis', No. 4, Moscow, 1956

DIANOVA, Ye. V., Cand Med Sci (diss) -- "The anatomy of the renal arteries, permanent and accessory, and the arteries of the kidney pelvis". Saratov, 1960.
11 pp (Min Health RSFSR, Saratov State Med Inst), 200 copies (KL, No 12, 1960, 130)

DIANOVA, Ye.V. (Salingrad, ul. Volgodonskaya, d.7, kv. 1)

Treating thrombophlebitis. Nov.khir.arkh. no.6:65-66 N-D '57.
(MIRA 11:3)

1. Khirurgicheskoye otdeleniye Stalingradskoy bol'nitsy No.11.
(VEINS--DISEASES) (NOVOCAINE)

DIANOVA, Ye. and VOROSHILOVA, A.

"Ultrafilters for Bacteriological Studies," Mikrobiologiya, 1, 271, 1932.

DIANOVA, Ye. and VOROSHILOVA, A.

"Role of Plankton in the Multiplication of Bacteria in Isolated Samples of Seawater," Mikrobiologiya, 6, 741, 1937.

[illegible]

COMMON ELEMENTS		PROCESS AND PROPERTIES INDEX	
<p>CA</p>		<p>11C</p>	
<p>The use of wood ashes in the culture of food yeasts grown on hydrolyzates from plant materials. A. A. Voroshilova and E. V. Dianova. <i>Pishchevye Prom.</i> 1944, No. 11, 8-12.—Wood ash has little water-sol. alkali, but contains much acid-sol. alkali (1 g. ash can neutralize 70-100 cc. of 0.1 N H₂SO₄). For this reason wood ash can be used in place of lime in the neutralizing of hydrolyzates for the production of food yeasts. The ash also supplies significant amts. of P and K in the nutrition of the yeast. Wood ash does not lower the yield of food yeast and has no adverse effect on the taste quality of the product. The wood ash may conveniently be produced from the ashing of the residue left from the hydrolysis of sawdust. S. Gottlieb</p>			
<p>ASH-51A METALLURGICAL LITERATURE CLASSIFICATION</p>			
<p>FROM SYNDICATE</p>		<p>FROM SYNDICATE</p>	
<p>120000 0.2</p>		<p>120000 0.2</p>	
<p>1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43 44 45 46 47 48 49 50 51 52 53 54 55 56 57 58 59 60 61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80 81 82 83 84 85 86 87 88 89 90 91 92 93 94 95 96 97 98 99 100</p>		<p>1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43 44 45 46 47 48 49 50 51 52 53 54 55 56 57 58 59 60 61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80 81 82 83 84 85 86 87 88 89 90 91 92 93 94 95 96 97 98 99 100</p>	

11C

CA

Media promoting bacterial growth and partly or entirely replacing agar. A. A. Voroshilova and E. V. Dianova. *Microbiologia* 14, 119-28(1948).—Diffusion of 0.1 N HCl into phenolphthalein-thin agar is 35-50% faster at 0.5 than at 3% agar concn. Hence media for more and faster bacterial growth should have the lowest possible agar concn. Solid fillers (sand, glass powder, porous glass, paper, gauze, or the like) are helpful in liquid or semisolid low-agar media. Such mixts. may be covered with a thin layer of solid high-agar medium. Media with filler are useful with membrane filters, in making bacterial counts, in isolating pure cultures (instead of agar slants), and for mass production of vaccines or bacterial fertilizers. Colonies grow 2-6 times larger and with 3-4 times as many cells as in ordinary solid media. The growth-promoting effect is due to faster diffusion of nutrients, to surface spreading of cells, and probably to changes in surface tension and adsorption behavior. Julian F. Smith

Central Sci. Res. Station Inst. in Yuzovsk, Moscow

ASM-514 METALLURGICAL LITERATURE CLASSIFICATION

1ST AND 2ND DEGREE										3RD AND 4TH DEGREE																			
PROCESSES AND PROPERTIES INDEX																													
<div style="float: left; width: 10%; font-size: 2em;">C</div> <div style="float: right; width: 10%; text-align: right;">7</div> <div style="clear: both;"></div> <p>Analysis of hydrocarbons and similar gases G. A. Mogilevskii and K. V. Blazova. U.S.S.R. 66,028, June 30, 1947. The gaseous mixt. is consecutively brought in contact with bacterial cultures having the ability to oxidize definite components of the gas. The change of vol. over each culture and the content of oxidation products is detd. for each of the cultures used. M. Hosh</p>																													
<div style="float: left; width: 10%;"> 1ST DEGREE 2ND DEGREE 3RD DEGREE 4TH DEGREE 5TH DEGREE 6TH DEGREE 7TH DEGREE 8TH DEGREE 9TH DEGREE 10TH DEGREE 11TH DEGREE 12TH DEGREE 13TH DEGREE 14TH DEGREE 15TH DEGREE 16TH DEGREE 17TH DEGREE 18TH DEGREE 19TH DEGREE 20TH DEGREE 21ST DEGREE 22ND DEGREE 23RD DEGREE 24TH DEGREE 25TH DEGREE 26TH DEGREE 27TH DEGREE 28TH DEGREE 29TH DEGREE 30TH DEGREE 31ST DEGREE 32ND DEGREE 33RD DEGREE 34TH DEGREE 35TH DEGREE 36TH DEGREE 37TH DEGREE 38TH DEGREE 39TH DEGREE 40TH DEGREE 41ST DEGREE 42ND DEGREE 43RD DEGREE 44TH DEGREE 45TH DEGREE 46TH DEGREE 47TH DEGREE 48TH DEGREE 49TH DEGREE 50TH DEGREE 51ST DEGREE 52ND DEGREE 53RD DEGREE 54TH DEGREE 55TH DEGREE 56TH DEGREE 57TH DEGREE 58TH DEGREE 59TH DEGREE 60TH DEGREE 61ST DEGREE 62ND DEGREE 63RD DEGREE 64TH DEGREE 65TH DEGREE 66TH DEGREE 67TH DEGREE 68TH DEGREE 69TH DEGREE 70TH DEGREE 71ST DEGREE 72ND DEGREE 73RD DEGREE 74TH DEGREE 75TH DEGREE 76TH DEGREE 77TH DEGREE 78TH DEGREE 79TH DEGREE 80TH DEGREE 81ST DEGREE 82ND DEGREE 83RD DEGREE 84TH DEGREE 85TH DEGREE 86TH DEGREE 87TH DEGREE 88TH DEGREE 89TH DEGREE 90TH DEGREE 91ST DEGREE 92ND DEGREE 93RD DEGREE 94TH DEGREE 95TH DEGREE 96TH DEGREE 97TH DEGREE 98TH DEGREE 99TH DEGREE 100TH DEGREE </div>																				1ST DEGREE 2ND DEGREE 3RD DEGREE 4TH DEGREE 5TH DEGREE 6TH DEGREE 7TH DEGREE 8TH DEGREE 9TH DEGREE 10TH DEGREE 11TH DEGREE 12TH DEGREE 13TH DEGREE 14TH DEGREE 15TH DEGREE 16TH DEGREE 17TH DEGREE 18TH DEGREE 19TH DEGREE 20TH DEGREE 21ST DEGREE 22ND DEGREE 23RD DEGREE 24TH DEGREE 25TH DEGREE 26TH DEGREE 27TH DEGREE 28TH DEGREE 29TH DEGREE 30TH DEGREE 31ST DEGREE 32ND DEGREE 33RD DEGREE 34TH DEGREE 35TH DEGREE 36TH DEGREE 37TH DEGREE 38TH DEGREE 39TH DEGREE 40TH DEGREE 41ST DEGREE 42ND DEGREE 43RD DEGREE 44TH DEGREE 45TH DEGREE 46TH DEGREE 47TH DEGREE 48TH DEGREE 49TH DEGREE 50TH DEGREE 51ST DEGREE 52ND DEGREE 53RD DEGREE 54TH DEGREE 55TH DEGREE 56TH DEGREE 57TH DEGREE 58TH DEGREE 59TH DEGREE 60TH DEGREE 61ST DEGREE 62ND DEGREE 63RD DEGREE 64TH DEGREE 65TH DEGREE 66TH DEGREE 67TH DEGREE 68TH DEGREE 69TH DEGREE 70TH DEGREE 71ST DEGREE 72ND DEGREE 73RD DEGREE 74TH DEGREE 75TH DEGREE 76TH DEGREE 77TH DEGREE 78TH DEGREE 79TH DEGREE 80TH DEGREE 81ST DEGREE 82ND DEGREE 83RD DEGREE 84TH DEGREE 85TH DEGREE 86TH DEGREE 87TH DEGREE 88TH DEGREE 89TH DEGREE 90TH DEGREE 91ST DEGREE 92ND DEGREE 93RD DEGREE 94TH DEGREE 95TH DEGREE 96TH DEGREE 97TH DEGREE 98TH DEGREE 99TH DEGREE 100TH DEGREE									

CA

14

Field apparatus for water sampling and a funnel for gas sampling from water reservoirs. A. A. Vinogradova and L. V. Dianova. *Gigiena i Sanu* 1959, No. 11, 45-8. Descriptions and diagrams of a portable bottom-opening water sampler and a gas-sampling funnel, the upper opening of which connects to a water-displacement type collection bottle. G. M. Kozolapov.

(1935)

CA

14

Bacterial oxidation of petroleum and its movement in natural waters. A. A. Voroshilova and E. V. Danilova - (Brisman Central Research Inst. Hyg., Moscow). *Mikrobiologiya* 10, 203-10(1950). - Oil films on rivers may cause up to 35-fold increase in surface bacterial count. Aerobic oxidation attacks floating oil, and oil or oxidation products rising with evolved gases from submersion. Anaerobic oxidation attacks submerged or suspended oil, mainly heavy fractions, consuming dissolved O_2 or NO_3^- or SO_4^{--} . Aided by denitrifying or desulfurizing bacteria, the oxidation stops at the naphthenic or polynaphthenic acid stage. In winter liberated H_2S , shut off from air by ice, is especially harmful to life. Pollution studies must allow for the slow reaction (5-6 days to reach peak bacterial activity) and for localized accumulation where flow is sluggish.

Julian F. Smith

231720

USSR/Medicine - Sanitation

May/Jun 52

"Rules Pertaining to the Development of Saprophytic Bacteria in the Process of Self-Purification of Contaminated Rivers," E. V. Dianova, A. A. Voroshilova, Gen Sci Exptl Sanitation Inst Imeni Erisman

"Microbiologiya" Vol 21, No 3, pp 311-320

Investigations showed that biol self-purification of water of contaminated rivers depend on the natural development of bacteria in it. The development of bacteria depends on a number of

231720

environmental factors, the most important of which are salt content of water, temp, aeration, speed of flow of river dlm, soil deposits, phyto-zooplankton, presence of bacteriophage, and others.

231720

11/10/00 77

CA

Petroleum-oxidizing bacteria: activity indexes for biological oxidation of crude oil under natural conditions. A. A. Vorobkova and B. V. Dianova. *Microbiologiya* 21, 408-16 (1982).—Oil-oxidizing bacteria are common in polluted streams, but generally account for only 0.05 to 5% of the total bacterial population when there is no pollution.

Their activity is seasonal; they may outnumber the saprophytes in polluted waters more than 100 to 1 in summer, and be outnumbered 2000 to 1 in winter. Among microorganisms which can oxidize crude oil are species of *Pseudomonas*, *Mycobacterium*, *Corynebacterium*, *Actinomyces*, *Proactinomyces*, *Serratia*, *Aspergillus*, and *Penicillium*. J. F. S.

DIANOVA, Ye.V.; VOROSHILOVA, A.A.

Method of detecting pathogenic bacteria with the aid of biological
antiseptics. Gig.i san. no.5:35-38 My '54. (MLRA 7:5)

1. Iz Nauchno-issledovatel'skogo sanitarnogo instituta im. Erismana.
(Bacteria, Pathogenic) (Antiseptics)

DIANOVA, YE. V.

AID P - 3661

Subject : USSR/Medicine
Card 1/1 Pub. 37 - 7/19
Authors : ~~Dianova, Ye. V.,~~ Voroshilova, A. A., Senior Scientific
Workers
Title : Use of antibiotics for the separation of pathogenic
bacteria of the intestinal group from river water and
other objects
Periodical : Gig. 1. san., 11, 32-37, N 1955
Abstract : Describes experiments with various antibiotics in culture
mediums and their effect on different types of bacteria.
Institution : Scientific Research Sanitation Institute im. Erisman
Submitted : J1 19, 1954

USSR / Microbiology. Sanitary Microbiology. Sanitary
Microbiology of the Air, F

Abs Jour: Ref Zhur-Biol., No 2, 1959, 5553.

Author : Dianova, Ye. V.
Inst : Moscow Sci. Res. Institute of Sanitation and Hygiene.

Title : Comparative Evaluation of Sedimentation and Aspiration Methods of Bacteriological Investigation of Atmospheric Air.

Orig Pub: Inform. byul. Mosk. n.-i. in-t sanitarii i gig-
iyeny, 1957, No 9, 16-21.

Abstract: The sedimentation method and two aspiration methods (Krotov apparatus and membrane filters) were compared in the course of investigation of atmospheric air. In using the sedimentation method, 2-56 times more bacteria are caught than

DIANOVA, Ye.V.

Use of hydrolytic media for the cultivation of microorganisms. Lab. delo
5 no.3:48-50 My-Je '59.
(MIRA 12:6)

1. Iz Moskovskogo nauchno-issledovatel'skogo instituta imeni F.F. Erismana.
(BACTERIOLOGY--CULTURES AND CULTURE MEDIA)

KALINA, G.P.; DIANOVA, Ye. V.; BUGROVA, V.I.; KRYLOVA, M.D.; PONÓMAREVA, Ye. P.;
STEPANENKO, V.K.; ZVEREVA, V.A.

Problems of sanitary bacteriology. Uch. zap. Mosk. nauch. issl. san.
i gig. no. 4: Frontpage '60 (MIRA 16:11)

Behavior of dysentery bacteria in an external medium. Ibid.: 5-10

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Card 1/2

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Microbiology of the Air.

Abs Jour: Ref Zhur-Biol., No 2, 1959, 5553.

Abstract: by the aspiration methods, which basically depends upon catching the large, heavy phase of bacterial aeroplankton. Therefore, in employing this method, the evaluation should be made only per 1 m² of area. The aspiration methods give a more accurate picture of atmospheric microflora, since they catch various phases of aeroplankton. With the aid of aspiration methods, many chromogenic microorganisms (31-60% of all the bacterial and rather few spore-forming bacteria (5-10%) are revealed. The sedimentation method encompasses considerably fewer chromogenic bacteria, while the percentage of determined spore-forming bacteria is increased. -- V. V. Vlodayets.

Card 2/2

28

CZECHOSLOVAKIA

BELAK, M.; DIANOVSKA, M.; JENCIKOVA, J.; Laboratory of Electron Microscopy, Veterinary Faculty, University (Laboratorium Elektro-novej Mikroskopie, Veterinarska Fakulta VSP), Kosice.

"On The Ultrastructure of Erythrocytes in the Intestine of Suckling Lambs."

Prague, Ceskoslovenska Fysiologie, Vol 15, No 5, Sep 66, p 367

Abstract: Epithelial cells in the intestine of healthy lambs age 1 to 35 days after a feed by mother's milk were investigated. In the cytoplasm of the enterocytes of the duodenum of 1 day old lambs a great number of vacuoles up to 7 microns long was found. In older lambs the phenomenon was not found. The importance of the resorption of food by the cells of the intestine in the transport and metabolism of food substances is discussed. 4 Western references. Submitted at 3 days of physiology of domestic animals at Liblice 9 Dec 65.

1/1

3 (5)

AUTHORS:

Korobov, S. S., Diarov, M.

SOV/20-126-4-42/62

TITLE:

On the Problem of the Effect of Tectonics on the Lithology of the Halogen Rocks (K voprosu o vliyanií tektoniki na litologiyu galogennykh porod)

PERIODICAL:

Doklady Akademii nauk SSSR, 1959, Vol 126, Nr 4, pp 841 - 844 (USSR)

ABSTRACT:

The borings carried out in the ~~Inderskoye~~ elevation showed the important role played by tectonics, as mentioned in the title. Due to considerable tensions occurring in the formation of the salt structures, and furthermore due to complicated and manifold deformations, to highly and unequal plastic properties of the saliferous rocks, greater masses of "cracked" and "brecciated" rocks form. Also epigenetic inner formation shifts of the lithological varieties which are accompanied by mineralogical transitions may occur. The nature of these phenomena of the "comminution" and "injection" depends on the character of those tectonic tensions which occurred in the various sections of the salt fold, and on the interrelation of the plastic properties of the rocks. The latter are determined not only by the structure and the composition of the crystalline lattices of the

Card 1/3

On the Problem of the Effect of Tectonics on the
Lithology of the Halogen Rocks

SOV/20-126-4-42/62

minerals but also by the content of molecular relic humidity. The "main anhydrite" which is stratified on the basis of the Kurgantauskaya suite is torn into individual blocks and partly intersected by a number of different cracks orientated in different directions. They are (as in Germany, Ref 1) filled by different secondary formations: a) neutral mechanical injections of single minerals or rocks into others, and b) formations which are connected with deep mineralogic transformations in the presence of relic waters (lyes). Among the latter, polyhalite is the most wide-spread. It is often separated from anhydrite by a reaction rim. Such a high degree of substitution was not found in the Inder (Ref 3) although S. V. Borodina observed all substitution stages under the microscope. Halite which is more plastic than anhydrite fills - as well as sylvite - even small cracks. Cracks in halite are filled by carnallite, saliferous loam and preobrazhenskite. The results of a tectonic action concerning the two minerals mentioned last are of interest. A wide-spread rock forms: breccia-like halite-carnallite-kieserite-preobrazhenskite. The qualitative ratio of the minerals they contain is very unstable (Fig 1). The forma-

Card 2/3

On the Problem of the Effect of Tectonics on the
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SOV/20-126-4-42/62

tion of boron in halite (Ref 4) may be apparently explained by the shifting of the preobrazhenskite together with the relic solutions which form in the salt dehydration due to the dynamic metamorphism. There are 4 figures and 4 Soviet references.

PRESENTED: February 21, 1959, by N. M. Strakhov, Academician

SUBMITTED: February 21, 1959

Card 3/3

DIAROV, M.

Effect of the composition of haloid rocks on the formation of
the cap rock. Vest.AN Kazakh.SSR 16 no.8:93-95 '60.
(MIRA 13:9)

(Salt deposits)

DIAROV, M.; DOGALOV, A.B.

Secondary variations in halogen rocks under the conditions of
salt dome structures. Izv. AN Kazakh. SSR. Ser. geol. no.1:86-
88 '61. (MIRA 14:6)

(Haloidite)

DIAROV, M.

Effect of lithology of halogens on the formation of cap-rock.
Trudy Inst.geol.nauk AN Kazakh.SSR no.4:100-102 '61.

(MIRA 14:10)

(Caspian ~~Lowland~~ --Salt domes)

VOROB'YEV, N.K.; DIAROV, M.; TUKHFATOV, K.

Role of the gerguit horizon in correlating the geological
sections of individual salt domes in the Caspian Sea region.
Vest. AN Kazakh. SSR 18 no.10:82-85 O '62.

(MIRA 17:9)

DIAROV, M.

Composition of potassium horizons in one of the salt domes
of the Caspian Sea region. Izv. AN Kazakh. SSR, Ser. geol. 22
no. 5: 71-75 S-O '65. (MIRA 18:12)

1. Institut geologii i geofiziki Ministerstva geologii SSSR,
g. Gur'yev.

DIAROVA, G.S.

Gyrodactylus cyprini, a new monogenetic trematode of carp. Trudy
Inst. zool. AN Kazakh. SSR 22:148-149 '64.

(MIRA 17:12)

DIBROVA, A.T.; LEMPERT, M.D.

Proteins and protein fractions of the blood in tuberculosis of the kidneys and nonspecific pyelonephritis. Trudy Kish. gos. med. inst. 24:123-126 '64 (MIRA 18:1)

1. Urologicheskaya klinika Kishinevskogo gosudarstvennogo meditsinskogo instituta i biokhimicheskaya laboratoriya Moldavskoy Respublikanskoy klinicheskoy bol'nitsy.

DIAS, L.

New nozzles against weeds in flax fields, p. 279.
(Mechanisace Zemedelstvi, Vol. 7, no. 12, June 1957. Praha, Czechoslovakia)

SO: Monthly List of East European Accessions (EEAL) LC, Vol. 6, no. 10, October 1957. Uncl.

DIAS, R.

Research on dusting devices for plant protection. p. 31.
SBORNIK. RADA MECHANISACE A ELEKTRIFIKACE ZEMEDLSTVI A LESNICTVI
Vol. 28, no. 1, Apr. 1955
Czechoslovakia

SOURCE: EAST EUROPEAN ACCESSIONS LIST Vol. 5, no. 7, July 1956

DIAS, R.; KVASNICA, L.

Plant protection centers and machinery proposed for equipping them. p. 45).
(MECHANISACE ZEMEDELSTVI, Vol. 6, No. 23, Dec 1956, Praha, Czechoslovakia)

SO: Monthly List of East European Accessions (EEAL) LC, Vol. 6, No. 12, Dec 1957. Uncl.

DEAS, J.; HENNINGSEN, J.

The p-200 tractor-drawn sprayer. p. 61. SROBNIK, RAP A MCHANICACE A
ELEKTRIFIKACE ZEMEDELSTVI A LEVNICTVI. Praha. Vol. 22, no. 2, Apr. 1956.

SOURCE: East European Accessions List, Vol. 5, no. 2, September 1956

DIAS, R.

"Progress in seed dressing." p. 60

MECHANISACE ZEMEDELSTVI. Praha, Czechoslovakia, Vol. 9, No. 3, 1959

Monthly list of East European Accession Index (EEIA), Library of Congress,
Vol. 8, No. 7, July, 1959, Unclassified

DIAS, Rostislav, inz.; MYSAK, Frantisek, inz.

Solgen type mechanical mist sprayers, a product of Czechoslovak research on plant protection mechanization. Zemedel tech 9 no.2:123-146 Ap '63.

1. Ustredni vyzkumny ustav rostlinne vyroby, Praha - Ruzyně.

DIAS, R., inz.; POSPISIHOVA, D., prom. biol.; DIRIBEK, J., inz.

Use of the new Czechoslovak machine Solgen V in fighting the
Colorado potato beetle. Rost vyroba 10 no. 4:435-440 Ap '64.

1. Central Research Institute of Plant Production, Ruzyne.

DIASAMIDZE, A. M. Cand Med Sci -- (diss) "Goiter in Adzhariya and the ^{control} struggle ~~of~~
~~against~~ it." Tbilisi, 1959. 32 pp (Tbilisi State Med Inst), 200 copies
(KL, 41-59, 106)

-41-

DIASAMIDZE, D.

[Ways for increasing labor productivity in vegetable growing on the collective farms of Georgia] Puti povysheniia proizvoditel'nosti truda v ovoshchevodstve kolkhovov Gruzinskoi SSR. Tbilisi, Izd-vo AN Gruz.SSR, 1963. 88 p. [In Georgian]
(MIRA 17:5)

DIASAMIDZE, L. N.

DIASAMIDZE, L. N. - Prof., i DZHANGIDZE, A. M. Inzh.

Institut stroitel'noge dela Akademii nauk Gruzinskoy SSR.

Voprosy gorodskogo mostostroyeniya v svyazi s trebovaniyami kommunal'nogo khozyaystva gorodov v usloviyakh gruzinskoy sssr. 89

SO: Collection of Annotations of Scientific Research Work on Construction,
completed in 1950,
Moscow, 1951

DIASAMIDZE, L.N.; DZHANGIDZE, A.M.

Causes of damage to metal pipes in water pipe lines of the
Georgian S.S.R. and protective measures. Trudy Inst. stroi.
dela AN Gruz. SSR 3:183-211 '51. (MLRA 9:10)

(Georgia--Water pipes--Corrosion)